First point of order: As a US service member stationed overseas I rely on custom firmware for my routers so I can operate within the guidelines of the host country I live in. I constantly have to battle between purchasing new 'country specific' equipment and/or updating my current firmware with a custom firmware specifically designed for the country I live.

Second point of order: Preventing people from modifying firmware puts the owner/consumer more at when you consider security updates. Manufactures are slow to release firmware updates, and most firmware support is non-existent for older routers. Third-party firmware can release updates almost immediately after a vulnerability has been discovered, hence protecting the owner/consumer from potential security compromises. Think of aftermarket parts for a car as a perfect example; I can go out and buy a new exhaust system for my car, be within state/federal regulations, and fix problems that arise throughout the course of owning the vehicle. The same applies to routers.

Third point of order: Finally, allowing third-party firmware to remain legal for routers is important for the promotion of competition. Allowing businesses to advertise that they allow 'custom firmware' on their routing devices is a HUGE selling point. When consumers have the choice, they can consume without fear of needing to purchase from a manufacturer who may not provide updates at some point in the future, ultimately allowing more products/ideas to the market, and driving down price for consumers. Does this mean that consumers may delay a purchase of a new router because they found firmware that their device supports!? Absolutely! However, people forget that technology marches forward promoting the 'want factor' for a new/better product.

Finally, the people who learn about custom firmware today, are the same people that develop for big name companies such as Cisco, Dell, and Hp. Technology marches on the heels of those ambitious enough to learn it, embrace it, and develop the next idea that moves America forward.